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San Luis Obispo, CA 93401
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April 26, 2016

Ms. Joni Anderson, President
Anderson Burton Construction, Inc.
1131 El Camino Real
Arroyo Grande, CA 93420

SUBJECT: Cumulative projects impacts analysis for proposed Hurley Ranch subdivision, 686 Erhart Lane, Arroyo Grande.

Dear Ms. Anderson:

Cleath-Harris Geologists (CHG) recently increased the water demand estimates being used for cumulative projects impacts analysis of the proposed Hurley Ranch subdivision, based on comments received from the City of Arroyo Grande (City). CHG concluded that the updated water demand from Pismo Formation aquifers in the Oak Park area was less than the sustainable yield estimate (letter dated April 22, 2016). The sustainable yield of the Pismo Formation, however, had been previously divided between upper and lower aquifers. This letter provides additional explanation as to why the cumulative projects analysis for Hurley Ranch does not require separating the total yield into upper and lower aquifers to reach a conclusion regarding long-term water availability.

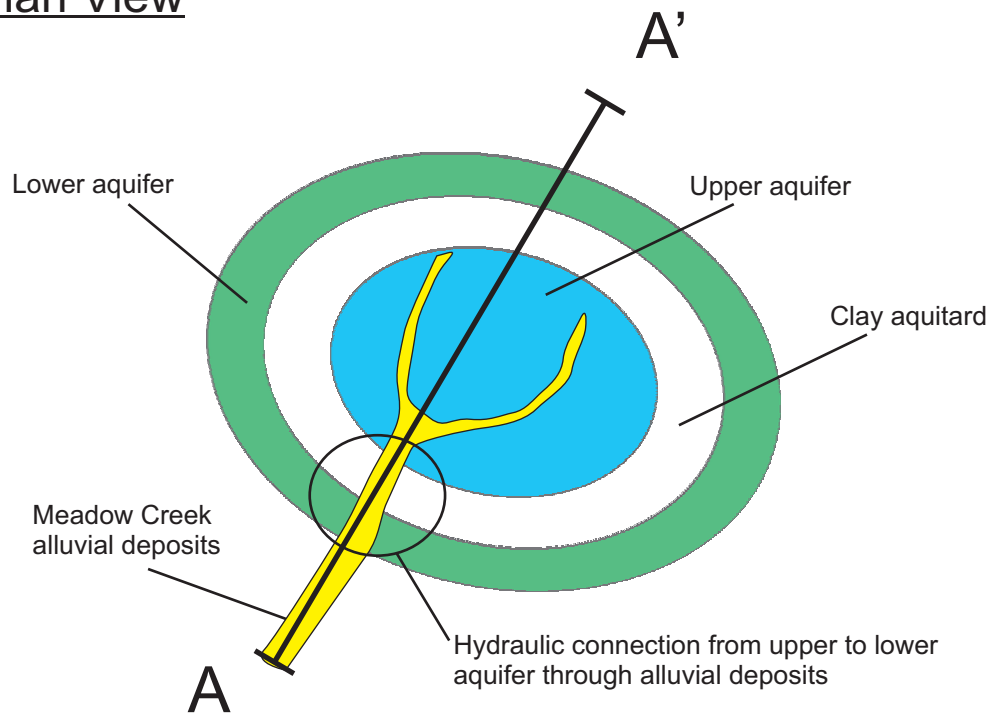
The Oak Park area aquifers were once flat-lying marine sand beds that have been folded into a basin. The upper aquifer can be visualized as a bowl positioned inside the lower aquifer, which is a larger bowl. Between these two bowls are relatively impermeable clays, except where connected by alluvial deposits. This structural basin is drained by tributaries to Meadow Creek and Arroyo Grande Creek.

Surface and subsurface outflow from the upper aquifer drains primarily into alluvial deposits along Meadow Creek tributaries, which cross the lower aquifer before exiting the basin (Figure 1). City wells in the Oak Park area tap the lower aquifer near these alluvial deposits, which are sources of recharge. Therefore, upper aquifer yield that is not being utilized by upper aquifer wells becomes available, through the connecting alluvial deposits, to the adjacent lower aquifer wells. As long as the total cumulative projects water demand is less than the total sustainable yield, lower aquifer well production (including proposed Hurley Ranch subdivision wells and City wells) will be sustainable.

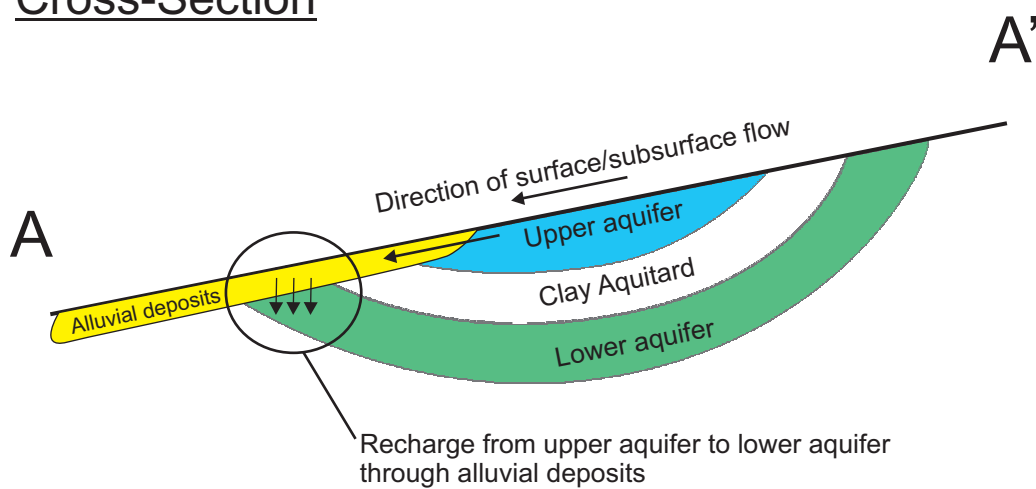
Sincerely,
CLEATH-HARRIS GEOLOGISTS

Spencer J. Harris, HG 633
Senior Hydrogeologist

Plan View



Cross-Section



NOT TO SCALE

Figure 1
Conceptual Drawing
Upper to Lower Aquifer Hydraulic Connection
Oak Park Area Pismo Formation
Anderson Burton Construction

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